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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/840,290	04/24/2001	Tae-kyoung Kang	1568.1012	4369

7590 12/04/2003
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EXAMINER

ROY, SIKHA

ART UNIT PAPER NUMBER

2879

DATE MAILED: 12/04/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application N .

09/840,290

Applicant(s)

KANG ET AL.

Examiner

Sikha Roy

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 November 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-13,15-28 and 37 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 4-13,15,16 and 19-27 is/are allowed.
- 6) ☒ Claim(s) 1-3,17,18,28 and 37 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ 6) ☐ Other: _____

DETAILED ACTION

The Amendment, filed on November 3, 2003 has been entered and is acknowledged by the Examiner.

Applicant's request for reconsideration of the finality of the rejection of the last Office action is persuasive and, therefore, the finality of that action is withdrawn.

Specification

The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

Claim Objections

Claims 1,4 and 5 are objected to because of the following informality:

In claim 1 line 13 'non-light emitting zone portion' should be replaced by --non-light emitting zone filling portion-- because it is the filling that comprises the same material used for one of the partitions.

Similar corrections are required for claims 4,5.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1- 3, 17,18, 28 and 37 are rejected under 35 U.S.C. 103(a) as being unpatentable over JP 05135702 to Murata and further in view of U.S. Patent 5,754,003 to Murai et al.

Referring to claim 1 Murata discloses (Figs. 1 and 2) a plasma display panel comprising a front glass substrate 3 and a rear glass substrate 1 coupled to each other by a sealing material 10 coated at edges of the front and rear glass substrates, first and second electrodes 4 and 2 respectively on opposing inner surfaces of front and rear glass electrodes crossing each other, partitions 5 formed on the rear glass substrate extending lengthwise in a first direction, a non-light emitting zone filling portion filling a non-light emitting zone 6 between the outermost of the partition and the sealing material, the non-light emitting zone filling portion comprising dummy barrier ribs having the same material used for the partitions 5 and having terminal ends defining a length of the outermost partition in the first direction.

Claim 1 differs from Murata in that Murata does not exemplify the dielectric layers on the opposing inner surfaces of the front and rear glass substrates covering the electrodes and red, green and blue fluorescent substances coated between adjacent partitions.

Murai in the analogous art of plasma display device discloses (Fig. 1 column 9 lines 27-50, column 10 lines 5-15,34-40) front plate 12 covered by a dielectric layer 22 and the backplate 14 covered by dielectric layer 26. It is known in the art that these dielectric layers covering the electrodes store the electric charge resulting from the discharge. Murai also discloses which is well within the teaching of art that red, green

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and blue fluorescent materials coated between the walls of the partitions providing three colored cells for picture elements.

Therefore it would have been obvious to one of ordinary skill in the art at the time of invention to include the dielectric layers covering the electrodes and red green and blue fluorescent material on the walls of the partitions of display panel of Murata as disclosed by Murai for storing the electric charge and providing colored picture elements in the display.

Regarding claim 2 Murata discloses (third embodiment, Fig. 8) that the outermost partition and the non-light emitting zone filling portion 6 are substantially formed integrally.

Regarding claim 3 Fig. 7 of Murata discloses the non-light emitting zone filling portion (false barrier ribs) surrounds the barrier ribs 5 and fills the space between the outermost partition and the sealing materials at the end.

Regarding claim 17 it is evident from Fig. 8 that Murata discloses the non-light emitting zone filling portion is connected to and has the same height as of the outermost partition.

Claim 18 recites the limitation same as of claim 3 and hence is rejected for the same reason.

Regarding claim 28 Murata and Murai disclose all the limitations which are same as claim 1 and additionally disclose inert gas disposed within the display panel. From the Fig. 8 (embodiment 3) of Murata because the non-light emitting zone filling portion is integrally formed with the outermost partition and fills the space between the outermost

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partition and the seal it would be obvious to specify that the inert gas is disposed in the space within the panel only.

Regarding the limitation reciting 'to prevent a discharge of first electrodes in the space between the outermost partition and the seal' it is elementary that mere recitation of a newly discovered function or property, inherently possessed by things in the prior art, does not cause a claim drawn to distinguish over the prior art. Additionally, where the Patent Office has reason to believe that a functional limitation asserted to be critical for establishing novelty in the claimed subject matter may, in fact, be an inherent characteristic of the prior art, it possesses the authority to require the applicant to prove that the subject matter shown to be in the prior art does not possess the characteristic relied on. Thus, the functional limitation of preventing discharge of the first electrodes in the space between the outermost partition and the seal is taught by Murata under the principles of functional inherency.

Claim 37 essentially recites the limitation similar to those in claim 28 and hence is rejected for the same reason.

Allowable Subject Matter

Claims 4-13,15,16,19-27 are allowed over the prior art of record.

The following is an examiner's statement of reasons for allowance:

Regarding claims 4,7,15 and 19 the prior art of record does not teach or suggest a plasma display panel with all the limitations as claimed and particularly the limitation

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comprising the non-light emitting zone filling portion covering at least one end portion of the first electrode on the front substrate.

Claims 8-13 are allowed because of their dependency status from allowed base claim 7.

Claims 16,23-27 are allowed because of their dependency status from allowed base claim 15.

Claims 20-22 are allowed because of their dependency status from allowed base claim 19.

Regarding claim 5 the prior art of record does not teach or suggest a plasma display panel with all the limitations as claimed and particularly the limitation comprising the gas exhaust hole formed at the upper surface of the non-light emitting zone filling portion parallel to a lengthwise direction of the outermost partition.

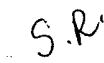
Claim 6 is allowed because its dependency status from allowed claim 5.

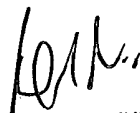
Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sikha Roy whose telephone number is (703) 308-2826. The examiner can normally be reached on Monday-Friday 8:00 a.m. – 4:30 p.m.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nimeshkumar D. Patel can be reached on (703) 305-4794. The fax phone number for the organization is (703) 308-7382.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.


Sikha Roy
Patent Examiner
Art Unit 2879


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